STAT

CLASSIFICATION RESTRICTED RESTRICTED
SECURITY INFORMATION
CENTRAL INTELLIGENCE AGENCY REPORT
INFORMATION FROM
FOREIGN DOCUMENTS OR RADIO BROADCASTS CD NO. --

COUNTRY	Austria	DATE OF INFORMATION	1949 - 1951
SUBJECT	Economic - Coal production and consumption		
HOW PUBLISHED	Monthly periodicals	DATE DIST.	12 MAR 1952
WHERE PUBLISHED	Vienna	NO. OF PAGES	6
DATE PUBLISHED	Aug 1950, Jan 1951		
LANGUAGE	German	SUPPLEMENT TO REPORT NO.	

THIS IS UNEVALUATED INFORMATION

SOURCE Periodicals as indicated.

COAL PRODUCTION AND CONSUMPTION IN AUSTRIA

Unless otherwise indicated, the following data is derived from a report of the Austrian National Committee at the Fourth World Power Congress, London 1949, entitled "The Sources and Development of Austria's Supply of Energy." The report was compiled by O. Ruiss and O. Vas and was reprinted in condensed form in the Vienna periodical Oesterreichische Zeitschrift fuer Elektrizitaetswirtschaft, Vol III, No 8, 1950.

A. Resources

According to the 1948 survey, the certain and probable coal reserves of Austria (to the extent that they now appear worth mining and capable of profitable exploitation under peacetime domestic competition) amount to about 200 x 10^6 tons. Of this, about one percent is bituminous, about 10 percent glance brown coal, and about 89 percent dull brown coal and lignite. Converting brown coal to bituminous (at a ratio of 2:1), a total reserve of about 100 x 10^6 tons results.

Ancient coal-containing strata in the Alps are only moderately developed. A rather high production has been reached at Gruenbach am Schneeberg, which since 1831 has provided the major part of domestic bituminous production.

The tertiary brown coals greatly outweigh bituminous in magnitude of deposits and quantities produced. In the Alpine area, these have mostly been converted to glance brown coal (5,000-6,000 kilocalories per kilogram) by geological pressure. The other coal fields produce mainly dull brown coal, in part of wood composition (heating value 3,000-4,000 kilocalories per kilogram) and with a rather high water content (up to 40 percent); they provide approximately three fourths of the domestic coal production. The coal appears mainly near the surface and is partly surface-minded (see Table 1 below).

CLASSIFICATION RESTRICTED

STATE	X	NAVY	X	NSRB		DISTRIBUTION							
ARMY	X	AIR	X	FBI									

STAT

 RESTRICTED

The total number of Austrian mines (large and medium-sized companies in parentheses) is:

Bituminous	15	(1)
Glance coal	29	(3)
Ordinary brown coal	37	(11).

The mining industry employs about 16,000 workers.

Table 1. Austrian Coal Mines

Type of Coal	Name of Mine	Total Size And Development Of Deposit	Greatest Depth (meters)	Reserves (10^6 tons)	Ann Output (10^3 tons)	No of Workers
Bitumin-ous	Gruen-bach am Schnee-berg(1)	2.2 meters; several weak, structurally very disturbed seams	630	1.8	150	1,300
Glanc coal	Fohns-dorf(2)	Crumbles at 20 degrees	1,000	10.0	350	1,700
	See-graben near Leoben(3)	12 meters; strongly folded; in part only scattered remnant pillars		1.5	200	
	Poelfing-Bergla(4)	0.7-1.2 meters			125	
Lignite brown coal	Koeflach District					
	Karls-schacht(5)	3 seams, together up to 80 meters		80.0	632	1,820
	Zangtal	Surface mining			325	
	Oberdorf				150	
	Marien-schacht	4 seams, surface and depth mining			65	
	Barbara	Surface mining				
	Piberstein and Lauko-witz				200	
	St. Kathrein a.H.(6)				80	400
	Goeriach				36	200
	Wolfsegg-Trauntal District(7)	2 seams; 1.7-3.2 and 2-2.5 meters		45.-	785	3,000

 RESTRICTED

STAT

 RESTRICTED

Type of Coal	Name of Mine	Total Size And Development Of Deposit	Greatest Depth (meters)	Reserves (10^6 tons)	Ann Output (10^3 tons)	No of Workers
	Oster mieting, Upper Austria(8)	2 seams, each about 2 meters		15.-		
	Langau near Geras(9)	3-5 meters; surface mining		3.-		
	Neufeld, North Austria(10)	8-10 meters; surface mining				
	St. Stefan and Wiese-nau(11)	2 x 2 meters		50.-	180	800
	Tauchen	10 meters		4.0	68	300

Notes

1. Extraction through prop mining (Strebbau), with coal-cutting machines.

2. Rock temperatures of over 40 degrees centigrade, high mountain pressure, presence of methane and explosive coal dust necessitate a great deal of ventilation (about 10,000 cubic meters per minute), steel structures in the mine, shaft watering, etc. Production is rising.

Washing of coal. Inferior part of the output is used in the Fohnsdorf Power Plant (annual current production 60 x 10^6 kilowatt-hours). Depth boring is planned in the southern part of the mine.

3. 6,000 kilocalories/kilogram. 1939 - 1945 forced mining. Worked mainly by hydraulic packing (danger of mine fire).

4. 4,500 kilocalories/kilogram. Bergla shaft works being extended. Production rising.

5. Partly surface-mined (dredging) to a depth of 50 meters; rest underground mining. Reduction of water content from 35 to 15 percent by steam pressure (Fleissner method; the coal remains in lumps). 1,000 tons dry coal per day, especially for foundries. Depth borings are planned in the east of the district.

6. 2.8-kilometer tunnels to the sorting plant located near the Ratten railroad stations; from there, 13 kilometers by cableway to the Hoenigsberg railroad station.

7. Prop mining with shaking shoots, partly with coal-cutting machines. From the ligneous portions a charcoal-like, low-temperature coke is produced. Investigations regarding the extent of reserves are in progress. Heating value of about 3,000 kilocalories per kilogram.

8, 9, and 10. Under development.

8. Heating value a little over 4,000 kilocalories per kilogram. Daily production at full operation, probably 1,000 tons per day.

 RESTRICTED

STAT

9. Depth 10-15 meters. Heating value a little over 3,000 kilocalories per kilogram.

10. Reserves for surface mining about 0.5 x 10^6 tons. Economic possibility of exploitation of the very considerable deeper seams is still to be ascertained (in consideration of mountain pressure, covering layer of quicksand, mediocre quality of coal -- 3,000 kilocalories per kilogram).

9 and 10. Only recently in operation.

11. About 4,000 kilocalories per kilogram. Under development. Construction of a power plant at the St. Stefan mine planned. Depth borings now in progress.

B. Utilization

Table 2 shows domestic production and imports of coal from 1924 to 1948. Domestic production is to be brought to about 4 x 10^6 tons (about 2 x 10^6 tons bituminous value) in the future, and will, as in the past, cover 25 to 40 percent by weight of the requirements, but only 29 percent by caloric content. To fill the power gap in the winter, stoking coal for steam power plants will continue to be necessary; for this purpose, small coal, coal producing much ash, and types not suitable for long haulage will serve. New processes would, however, also permit the extraction of higher-quality gas from the more mediocre types of coal.

Table 2. Austria's Coal Production and Coal Supply, 1924 - 1948

(Figures for 10^3 tons. G = weight; SKW = bituminous value.)

Year	Domestic Production: Bituminous G = SKW	Domestic Production: Brown Coal G	Domestic Production: Brown Coal SKW	Total G	Total SKW	Imports from Abroad: Bituminous (G = SKW)	Imports from Abroad: Coke (G = SKW)	Imports from Abroad: Brown Coal G	Imports from Abroad: Brown Coal SKW	Imports from Abroad: Total SKW	Total Domestic And Foreign Coal (SKW)
1924	172	2,750	1,375	2,922	1,547	4,538	379	848	424	5,341	6,888
1934	249	2,714	1,357	2,963	1,606	2,604	323	156	78	3,005	4,611
1944	195	3,673	1,837	3,868	2,031	5,600	883	2,607	1,303	7,786	9,818
1945	72	2,066	1,033	2,138	1,069	418	59	81	40	517	3,586
1946	103	2,154	1,077	2,257	1,180	1,459	186	710	355	2,000	3,180
1947	172	2,885	1,443	3,057	1,614	2,315	193	1,282	641	3,149	4,763
1948	178	3,338	1,169	3,516	1,847	3,910	267	1,563	782	4,959	6,805

STAT

RESTRICTED

The following two tables have been compiled from the Vienna periodical Statistische Nachrichten, Vol VI, No 1, 1951:

Table 3. Austrian Domestic Coal Production In 1949 and 1950 (tons)

Year	Bituminous	Brown Coal	Total
1949	183,000	3,816,000	3,999,000
1950	183,000	4,308,000	4,491,000

Table 4. Austria's Solid Fuel Supply and Consumption in 1949 and 1950

	1949	1950
Fuel supply (tons)		
Bituminous coal	4,593,000	4,469,000
Lignite	4,737,000	4,817,000
Coke	1,474,000	1,890,000
Amount thereof imported (tons)		
Bituminous coal	4,394,000	4,249,000
Lignite	1,429,000	1,067,000
Coke	323,000	254,000
Total fuel delivered to consumers (tons) (1)	8,426,000	8,468,000
Fuel delivered to consumers, (percent)		
Gas and water works	8.0	7.9
Power plants	8.2	5.4
Austrian Federal Railroads	14.2	14.2
Other transportation	0.6	0.5
Industry	51.9	53.9
Household consumption	17.1	18.1
Power consumption (kw-h)	3,642,700,000	4,110,400,000(2)

1. Bituminous value
2. Preliminary figure

The following table shows the coal consumption of the Austrian Federal Railroads and the quantity of coal saved through electrification.

Table 5

Year	Coal Consumption (1) of the Austrian Federal Railroads (tons)	Quantity of Coal (1) Saved Through Electrification (tons)
1929 (2)	2,162,000	286,000
1933 (3)	1,309,000	336,000
1937	1,413,000	347,000
1946	1,267,000	626,000
1947	1,351,000	664,000
1948	1,594,000	769,000

1. Normal coal -- 4,400 kilocalories per kilogram
2. Year of heaviest traffic before the depression
3. Year of lightest traffic during the depression

- END -

RESTRICTED

Declassified in Part - Sanitized Copy Approved for Release 2011/10/31 : CIA-RDP80-00809A000700040619-9